

ABSTRACT

An active paste for an lead-acid electrochemical cell which in a preferred embodiment includes tin; a method of manufacturing the same; and an electrochemical cell utilizing the same. The tin may be a tin sulfate, tin oxide, or metallic tin. The active paste sandwiches a primarily lead film which may, but need not, also include tin, to form a positive electrode. One or more positive electrodes are interleaved with a number of negative electrodes, separated by a separator material. The assembly is placed in a container and electrolyte is introduced. In alternate embodiments, the paste may include some combination of antimony, arsenic, germanium, indium, selenium, gallium, tellurium or other semiconductor materials with or without tin compounds.